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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/618,687	07/15/2003	Tetsuro Ogawa	P23556	5517

7055 7590 09/05/2006

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EXAMINER	
GROUP, KARL E	

ART UNIT	PAPER NUMBER
1755	

DATE MAILED: 09/05/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	10/618,687	OGAWA ET AL.	
	Examiner	Art Unit	
	Karl E. Group	1755	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *15 August 2006*.

2a)☒ This action is **FINAL**. 2b)☐ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-3,5,7,9,12-15,17-19,22,24 and 25* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1-3,5,7,9,12-15,17-19,22,24,25* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☐ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date 8/15/06
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____ .
5) ☐ Notice of Informal Patent Application (PTO-152)
6) ☐ Other: _____.

Claim Rejections - 35 USC § 102

1. The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.

2. Claims 12,14,15,18,25 are rejected under 35 U.S.C. 102(b) as anticipated by or, in the alternative, under 35 U.S.C. 103(a) as obvious over Pfeil et al (4,135,935), for reasons of record.

Applicants request the obviousness rejection to be explained and the next action to be made non-final. The obviousness rejection was explained in the fourth full paragraph, page 4 of the office action 3-29-06 and considered proper. It is noted applicants have substantially amended the claims and therefor this office action will be made final.

It is argued that the example of Pfeil et al includes an amount of CaO outside the claims. This is not persuasive in overcoming the rejection because there is also CaO in the $Ca_3(PO_4)_3$ which was excluded from the calculation of the amount of CaO. Note glass components go into solution therefor this amount of CaO should be included in the glass and would equal greater than 30 mol% CaO. Secondly a reference may be used for all it realistically teaches and is not limited to the specific examples. The ranges taught by Pfeil et al clearly encompass the claimed invention.

The claims are considered anticipated or in the alternative the subject matter as a whole would have been obvious to one having ordinary skill in the art at the time of the invention to have selected the overlapping portion of the range disclosed by the prior art because overlapping ranges have been held to be a prima facie case of obvious, see In re Malagari, 182 U.S.P.Q 549.

Applicants' argument that the rejection does not address the "consisting essentially of" terminology in the claims is not persuasive in overcoming the rejection. Applicants have not recited what components required by Pfeil et al are excluded from the claims as materially affecting the basic characteristics of the invention. The rejection of claim 14 is maintained because claims 14 does NOT recite a positive amount of B_2O_3. Claim 14 does not recite "an amount" "is present". This position is considered further supported by applicants' disclosure which lists B_2O_3 as an optional component.

3. Claims 1-3,5,7,9,22,24 are rejected under 35 U.S.C. 103(a) as being unpatentable over Fujiu et al (4,708,652), for reasons of record.

The rejection under 102 is withdrawn because the example of Fujiu et al falls outside the claim ranges.

However, he subject matter as a whole would have been obvious to one of ordinary skill in the art at the time the invention was made to have selected the overlapping portion of the range disclosed by the reference because overlapping ranges have been held to be a prima facie case of obviousness, see In re Malagari, 182 U.S.P.Q. 549.

Applicants argument that Fujiu et al fail to teach the glass as a sintering aid is not persuasive because the body of Fujiu et al is reaction sintered and therefor the glass would inherently aid in the sintering of the body, see column 4, lines 1-4.

It is further argued that the broad ranges taught by Fujiu et al do not sufficiently render obvious the compositions of the instant claims. This is not persuasive because Fujiu et al teach glass compositions overlapping the instant claims have a bio affinity and may be used as an implant material not unlike the

instant claims. It would have been obvious to one of ordinary skill in the art to select compositions with the taught ranges absent unexpected results, by way of a declaration, to the contrary. As to the reference to example 9 the claims are silent as to the cell attachment, proliferation and alkaline phophotase activity. Furthermore, all the claims are not commensurate in scope with example 9 which requires Na_2O and CaF.

Also the claim 17 requiring a composition "consisting essentially of" the named components (page 26 of the arguments) is not included in this rejection.

Claim 25 does not require the glass to be raised to a crystallization temperature merely "if" the glass is raised to such a temperature.

Double Patenting

4. The nonstatutory double patenting rejection is based on a judicially created doctrine grounded in public policy (a policy reflected in the statute) so as to prevent the unjustified or improper timewise extension of the "right to exclude" granted by a patent and to prevent possible harassment by multiple assignees. A nonstatutory obviousness-type double patenting rejection is appropriate where the conflicting claims are not identical, but at least one examined application claim is not patentably distinct from the reference claim(s) because the examined application claim is either anticipated by, or would have been obvious over, the reference claim(s). See, e.g., *In re Berg*, 140 F.3d 1428, 46 USPQ2d 1226 (Fed. Cir. 1998); *In re Goodman*, 11 F.3d 1046, 29 USPQ2d 2010 (Fed. Cir. 1993); *In re Longi*, 759 F.2d 887, 225 USPQ 645 (Fed. Cir. 1985); *In re Van Ornum*, 686 F.2d 937, 214 USPQ 761 (CCPA 1982); *In re Vogel*, 422 F.2d 438, 164 USPQ 619 (CCPA 1970); and *In re Thorington*, 418 F.2d 528, 163 USPQ 644 (CCPA 1969).

A timely filed terminal disclaimer in compliance with 37 CFR 1.321(c) or 1.321(d) may be used to overcome an actual or provisional rejection based on a nonstatutory double patenting ground provided the conflicting application or patent either is shown to be commonly owned with this application, or claims an invention made as a result of activities undertaken within the scope of a joint research agreement.

Effective January 1, 1994, a registered attorney or agent of record may sign a terminal disclaimer. A terminal disclaimer signed by the assignee must fully comply with 37 CFR 3.73(b).

5. Claims 1-3,5,7,9,12-15,17-19,22,24,25 are provisionally rejected on the ground of nonstatutory obviousness-type double patenting as being unpatentable over claims 1-11 of copending Application No. 10/962557. Although the conflicting claims are not identical, they are not patentably distinct from each other because of reasons set forth.

This is a provisional obviousness-type double patenting rejection because the conflicting claims have not in fact been patented.

Applicants have not presented any arguments traversing this rejection.

6. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

7. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Karl E. Group whose telephone number is

571-272-1368. The examiner can normally be reached on M-F (6:30-4:00) First Friday Off.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Jerry Lorengo can be reached on 571-272-1233. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Karl E Group
Primary Examiner
Art Unit 1755

Keg
8-30-06